

What is claimed is:

1. A submount for an opto-electronic module for outputting light incident from an opto-electronic device as an electrical signal, the submount comprising:

a dielectric material having a polygonal shape with a front face and a bottom face; and

an interconnection line having a coplanar waveguide structure, attached to the front face and the bottom face of the dielectric material, and electrically connected to the opto-electronic device to output signals from the opto-electronic device.

2. The submount for an opto-electronic module of claim 1, wherein the interconnection line having a coplanar waveguide structure comprises a plurality of interconnection lines, which are spaced apart from each other.

3. The submount for an opto-electronic module of claim 2, wherein the interconnection lines are a first ground line, a signal transmission line, a second ground line, and a bias application line, respectively, which are sequentially disposed.

4. The submount for an opto-electronic module of claim 3, wherein the opto-electronic device is attached to a portion of the second ground line, which is attached to the front face of the dielectric material.

5. The submount for an opto-electronic module of claim 4, wherein the opto-electronic device attached to the second ground line is connected to the signal transmission line and the bias application line via wires.

6. The submount for an opto-electronic module of claim 2, wherein the distance between a portion of the signal transmission line and a portion of the second ground line on the bottom face of the dielectric material is greater than the distance between a portion of the signal transmission line and a portion of the second ground line on the front face of the dielectric material.

7. A packaging method using a submount for an opto-electronic module including a dielectric material and an interconnection line having a coplanar waveguide structure, the packaging method comprising:

- 5 (a) attaching an opto-electronic device to the interconnection line to electrically connect the opto-electronic device to the interconnection line; and
- (b) attaching the interconnection line, to which the opto-electronic device is attached, to a conductive interconnection line of a substrate.

10 8. The packaging method of claim 7, wherein step (b) is performed using conductive epoxy.